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10/578,696	05/09/2006	Tatsuya Hosoda	MIPFP185	3697

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EXAMINER	
PE, GEEPY	

ART UNIT	PAPER NUMBER
2483	

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/578,696	HOSODA ET AL.	
	Examiner	Art Unit	
	Geepy Pe	2483	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *14 January 2011*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-6,8-11 and 23-28* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-6,8-11 and 23-28* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *09 May 2006* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

1. Applicant's arguments filed 1/14/11, with respect to claims 1-6, 8-11, and 23-28, have been fully considered but they are not persuasive.

2. Claims 1-6, 8-11, 23, 24, and 26 remain rejected under 35 U.S.C. 101.

3. Claims 1-6, 8-10, and 23-28 remain rejected under 35 U.S.C. 102(b) as being anticipated by Ikeda et al. (US Pat. 6,704,029; hereinafter Ikeda; already of record).

4. Claim 11 remains rejected under 35 U.S.C. 103(a) as being unpatentable over Ikeda.

5. The Applicant(s) present(s) three (3) substantive argument(s) contending the Examiner's rejection(s) of claim(s) 1-6, 8-10, and 23-28 under 35 U.S.C. 102(b) as being anticipated by Ikeda and claim 11 under 35 U.S.C. 103(a) as being unpatentable over Ikeda, as was set forth in the Office Action of 10/14/10. However, after carefully reviewing the argument(s) presented and further scrutiny of the applied reference(s), the Examiner must respectfully disagree and maintain the grounds of rejections for the reasons that follow.

The Applicants first argue that Ikeda does not teach the step to "…extract moving picture data…" (Remarks of 1/14/11: pg. 8, lines 14-18). The Examiner respectfully disagrees. As shown in Ikeda, a feature of the key frame and even the color layout are determined in a moving picture scene (Ikeda: Fig. 6, S13). Seeing this step, alone, would show that Ikeda does indeed extract moving picture data.

With regards to the typographical error in the rejection of claim 2, the Applicants are correct, in that, the citation be from col. 3, line 56 - col. 4, line 3. As described in the citation, a

start, end, and key frames are identified in a scene (Ikeda: col. 3, line 66 - col. 4, line 3). The Examiner respectfully disagrees that Ikeda does not disclose the step of extracting at least one frame group, considering the citation that an important scene can be designated. That is, the beginning and end, which signifies identifying, or extracting, an important scene.

The Applicants lastly argue that Ikeda does not use "…a motion vector calculated by comparing frames of picture data…" (Remarks of 1/14/11: pg. 10, lines 14-20). The Examiner respectfully disagrees. It would have been obvious to one of ordinary skill in the art, at the time the invention was made, that the motion vector be used to compare frames of picture data after reading the summary of the invention. Although, only color layout is explicitly taught, Ikeda teaches that a similarity value is set based on image features, which, to one of ordinary skill in the art, could interpret as motion vectors.

Accordingly, the Examiner maintains the applicability of Ikeda. A detailed rejection follows below.

Claim Rejections - 35 USC § 101

6. 35 U.S.C. 101 reads as follows:

> Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

7. Claims 1-6, 8-11, 23, 24, and 26 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

A) The Examiner notes that "…printing on a recording medium…", "…recording moving picture data ... into a recording medium…", does not specify how the instructions are (a) associated with the medium, or (b) the nature of instructions. Data structures not claimed as

embodied (or encoded with or embedded with) in a computer readable medium are descriptive material per se, and are not statutory, Warmerdam, 33 F.3d at 1361, 31, USPQ2d at 1760). Similarly, computer programs claimed as computer listings, instructions, or codes are just the descriptions, expressions, of the program are not "physical things". They have neither computer components nor statutory processes, as they are not "acts" being performed. In contrast, a claimed "... computer readable medium encoded with a computer program..." is a computer element which defines structural and function interrelationships between the computer program and the rest of the computer, and is statutory, Lowry, 32 F.3d at 1583-84, 32 USPQ2d at 1035, Interim Guidelines, Annex IV (Section a).

B) The computer program as claimed is not properly associated with the operation. It is quite possible that the computer program may be an unrelated sub-routine or a simple commence instruction which then causes the computer to execute the operation that could be self-resident, and not encoded on the medium, Interim Guidelines, Annex IV (Section b).

C) Claims that recite nothing but the physical characteristics of a form of energy, such as frequency, voltage, or the strength of a magnetic field, define energy or magnetism, per se, and as such are nonstatutory natural phenomena (Specification, pg. 11, lines 9-10 & pg. 47, lines 10-16), O'Reilly, 56 U.S. (15 How.) at 112-14. Moreover, it does not appear that a claim reciting a signal encoded with functional descriptive material falls within any of the categories of patentable subject matter set for in § 101.

Claim(s) 1 is/are rejected under 35 U.S.C. 101 as not falling within one of four statutory categories of inventions. Supreme Court precedent and recent Federal Circuit decisions indicate a statutory "process" under 35 U.S.C. 101 must (1) be tied to another statutory category (such as

a particular apparatus), or (2) transform underlying subject matter (such as an article or material) to a different state or thing. While the instant claim(s) recite a series of steps or acts to be performed, the claim(s) neither transform underlying subject matter nor positively tie to another statutory category that accomplishes the claimed method steps, and therefore do not qualify as a statutory process. For example there is no apparatus mentioned either in the preamble nor in the subsequent limitations for executing the method, In re Bilski, 88 USPQ2d 1385 (Fed. Cir. 2008).

Claims 2-6 and 8-11 depend on claim 1 and are rejected under 35 U.S.C. 101 for the reason(s) stated above.

To be more specific, the step of evaluation can be a step of preprocessing and even done by people. Furthermore, the programmed computer is not a particular machine and may be embodied as software. Because claims 23 and 24 also include the steps of claim 1, the claims are also still rejected under 35 U.S.C. 101, along with the claims still being just a method claim.

Claim Rejections - 35 USC § 102

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

9. Claims **1-6, 8-10, and 23-29** are rejected under 35 U.S.C. 102(b) as being anticipated by Ikeda et al. (US Pat. 6,704,029; hereinafter Ikeda; already of record).

Re. **claim 1**, Ikeda teaches a moving picture data processing method for extracting a portion of moving picture data from moving picture data (Ikeda: Fig. 6), the method comprising:

a frame picture evaluation step of evaluating, using a programmed computer, each of a plurality of frame picture data included in the moving picture data on a basis of a specific condition, for generating first picture evaluation values depending on the evaluations (Ikeda: Fig. 6, element S11); and a moving picture data extraction step of extracting moving picture data based on the first picture evaluation values using the programmed computer, wherein the moving picture data includes a plurality of frame picture data which shows a moving picture for a period of time, and the plurality of frame picture data meets a specific condition (Ikeda: Fig. 6, element S13).

Re **claim 2**, Ikeda teaches an acquiring step of acquiring the moving picture data (Ikeda: col. 3, lines 35-37, 44-48), wherein the moving picture data extraction step includes the step of extracting at least one frame group that is a collection of chronologically consecutive frame picture data, from among the frame picture data having at least one of the first evaluation value and a change of the first evaluation value, the one meeting a specific condition (Ikeda: col. 3, lines 56 - col. 3, line 3), wherein the method further comprises a digest moving picture data generation step of generating digest moving picture data using at least a portion of the extracted frame group (Ikeda: col. 4, lines 14-23).

Re. **claim 3**, Ikeda teaches a dividing step of dividing the moving picture data to establish a plurality of scenes, each of the plurality of scenes containing a plurality of frames of the picture data (Ikeda: col. 3, line 66 – col. 4, line 4: i.e., the start and end of a scene divides the moving picture data to a plurality of scenes), wherein the moving picture data extraction step includes the step of extracting at least one of the frame groups from each of the scenes (Ikeda: col. 3, line 66 – col. 4, line 4: i.e., an important scene is extracted along with key frames).

Re. **claim 4**, Ikeda teaches that the dividing step includes the step of dividing the moving picture data based on a discontinuous change in the first evaluation value (Ikeda: col. 3, line 66 – col. 4, line 4: i.e., there is change from the scene designation module when a the end of a scene and a new start of a scene is established).

Re. **claim 5**, Ikeda teaches that the specific condition is that the first evaluation value is at least equal to a specific threshold value (Ikeda: col. 7, liens 9-13: i.e., importance level can also be an evaluation value and thresholds can be set to establish the levels).

Re. **claim 6**, Ikeda teaches a playback time input step of inputting a desired value of playback time of the digest moving picture data (Ikeda: col. 6, lines 45-60); and an adjusting step of adjusting the threshold value according to the desired value of playback time (Ikeda: col. 6, lines 65-67: i.e., the threshold can be established according to human observation).

Re. **claim 8**, Ikeda teaches that the moving picture data extraction step includes the step of assembling two frame groups and all frame picture data between the two frame groups, a time interval between the two frame groups being smaller than a specific value, for extracting as a single frame group (Ikeda: Fig. 10; col. 8, lines 23-34: i.e., frames are added to one group, likely from a second group since the interval is smaller than specified value).

Re. **claim 9**, Ikeda teaches a scene dividing step of dividing the moving picture data to establish a plurality of scenes, each of the plurality of scenes containing a plurality of the frame picture data (Ikeda: col. 3, line 66 – col. 4, line 4), wherein the moving picture data extraction step further includes the step of extracting the two frame groups and all frame picture data between the two frame groups as a single frame group, when the two frame groups and the all frame picture data between the two frame groups are within the same scene (Ikeda: Fig. 10).

Re. **claim 10**, Ikeda teaches that the moving picture data extraction step includes the step of extracting the frame group composed of at least a specific number of frame picture data (Ikeda: col. 8, lines 23-34: i.e., frames are added to reach a specific number of frames for the time interval).

Re. **claim 23**, Ikeda teaches a printing method for printing on a recording medium storing moving picture data, comprising: the moving picture data processing method in accordance with claim 1 (Ikeda: col. 12, lines 61-67); and a printing step of printing on the recording medium based on at least a portion of the plurality of frame picture data (Ikeda: col. 12, lines 61-67).

Re. **claim 24**, the claim(s) recites analogous limitations to claim(s) 23 above, and is/are therefore rejected on the same premise.

Re. **claims 25**, the claim(s) recites analogous limitations to claim(s) 1 above, and is/are therefore rejected on the same premise.

Re. **claims 26-28**, the claim(s) recites analogous limitations to claim(s) 1 and 23 above, and is/are therefore rejected on the same premise.

Claim Rejections - 35 USC § 103

10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

11. The factual inquiries set forth in Graham v. John Deere Co., 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

12. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

13. Claim **11** is rejected under 35 U.S.C. 103(a) as being unpatentable over Ikeda.

Re. **claim 11**, Ikeda does not explicitly teach that the frame picture evaluation step includes the step of calculating the first evaluation value using a motion vector calculated by comparing two frames of picture data that include the frame picture data targeted for calculation of the first evaluation value. However, Ikeda does teach a moving picture search (Ikeda: Fig. 12) which uses pattern matching and attribute information of a moving picture. Accordingly, because of the moving picture information, it would have been obvious to one of ordinary skill in the art at the time the invention was made to use motion vectors to compare two frames of picture data.

Conclusion

14. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

15. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Geepy Pe whose telephone number is (571)-270-3703. The examiner can normally be reached on Monday - Friday, 7:00AM - 3:30PM (EST).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Joseph Ustaris can be reached on 571-272-7383. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Geepy Pe/
Examiner, Art Unit 2483

/Joseph G Ustaris/
Supervisory Patent Examiner, Art Unit 2483